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### 33. *GRACILARIOPSIS LEMANEIFORMIS* (BORY) DAWSON – A RED ALGA REPORTED FROM CERTAIN BACKWATERS OF KERALA

A long cylindrical thalloid multifariously branched red alga was reported from Dhalawapuram (Ashtamudi lake), Kadalundi (Kadalundinagaram) and Mopla Bay (Kannur) and was later identified as *Gracilariopsis lemneiformis* (Fig. 1). The salinity in all these regions ranged from 14 to 20 ppt during the non-monsoon period; during the SW monsoon, this species could not sustain drop in salinity below 8.0 ppt. The species grows attached loosely to the sediment along with subdominant forms of green algae such as *Enteromorpha linza* and *Chaetomorpha linum*. The density ranged from 300-900 gm/sq. m in Mopla bay and 150-600 gm/sq. m in Dhalawapuram during the peak growth season of October to January. The standing crop in both the estuarine areas of about 20 hectares was estimated to be 12-15 tonnes (wet wt.)/yr.

In India, *Gracilariopsis lemneiformis* was reported from Pamban, Mandapam and Visakhapatnam by Umamaheswara Rao (1972). Preliminary survey conducted in certain areas of Ashtamudi lake revealed the presence of agarophytes, alginophytes and carrageenophytes (Nair *et al.* 1982); no attempt was made to quantify them and occurrence of this species was not reported. Resource assessment survey conducted by Chennubhotla *et al.* (1988) along the Kerala coast also did not record the occurrence of this alga; the present report is the first from the Kerala coast.

The polysaccharide content in this species ranged from 18 to 26% dry wt. The moisture content in the thallus was 87%. Since this alga has affinity towards sandy loam bottom, bottom set nets/rafts can be used for cultivation trials as polyculture with mussels or oysters.

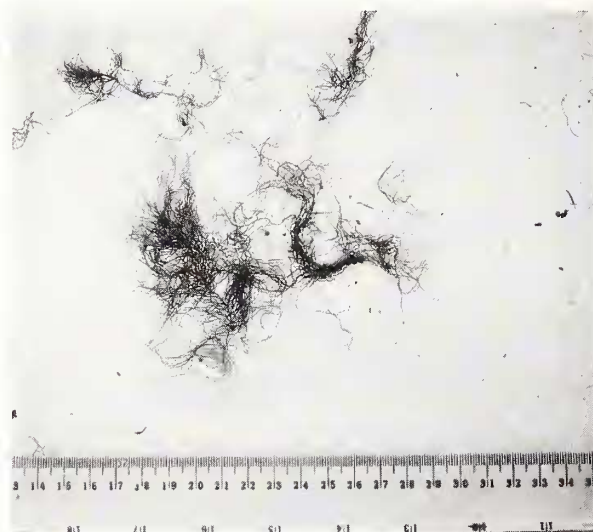


Fig. 1: *Gracilariopsis lemneiformis* collected from Dhalawapuram (Ashtamudi lake)

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